State of Alaska Department of Natural Resources DIVISION OF MINES AND MINERALS

P. O. Box 1391 Juneau, Alaska

MINES BULLETIN

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No. 8

MINING ACTIVITIES

FIRST DISTRICT - Interest has been renewed in the Hyder District because of the discovery of another lens of high grade gold and silver ore by lessees in the nearby Canadian Premier Mine.

Alaska will again produce uranium. The JOT Mining Co., under new management, is planning to mine and ship several thousand tons of ore this summer from the Kendrick Bay Mining Co. pit and adjacent claims at Bokan Mountain. The ore will be shipped to Lakeview, Oregon. Bokan Mountain is on the southern part of Prince of Wales Island. The first shipment of ore is scheduled for August 30.

THIRD DISTRICT - It is reported that Sunshine Mining Co., northern Idaho silver producer, is participating in a helicopter reconnaissance of two Alaskan areas. One area is northwest of Mount McKinley where high grade silver mineralization has been found; the other area is Mount St. Elias, where receding glaciers have left outcrops exposed.

The first trial run of brick making at the Atlas Brick and Tile Co. plant, 6 1/2 miles from Anchorage off the Seward highway, was made on July 12. The brick will be made of local clays, including clay from above the high tide level of Cook Inlet as well as some special clays from the Sheep Mountain area. The first production from the plant will be common standard building bricks and Norman Standard bricks. After the plant is in full operation, Atlas Brick will also manufacture floor and patio tile, drain tile, sewer pipe and fire brick.

OIL NEWS

The contract for construction of a 19-mile crude oil pipeline from the Swanson River and Soldotna Creek oil fields to a terminal at Nikiski has been awarded to the J. Ray McDermott Co. of New Orleans and Los Angeles. Two San Francisco firms, J.H. Pomeroy and Co., Inc., and its subsidiary Ben C. Gerwick, Inc., have been awarded a \$1,300,000 contract for construction of a deep water wharf which will serve as a terminus for the crude oil pipeline. The 900-foot wharf will handle 28,000-ton tankers. The work is being done for Kenai Pipeline Co., an affiliate of Standard Oil of California.

LEASE SALE

On July 13, 1960 at the YMCA Auditorium in Anchorage 34 bids were submitted on 26 tracts at this lease sale by Union Oil Co. of California - Chio Oil Co. (combine), Standard Oil Co. of California - Richfield Oil Co. (combine), Pure Oil Co., Pan American Petroleum Co., Sunray Mid-Continent Oil Co., Texaco Inc., and Mr. Leroy H. Hines. All bidders were successful on at least one tract except Pan American, Texaco, and Standard Oil of California-Richfield.

The University lands averaged \$87.66 per acre for a total of \$326,928.00 on 19 tracts amounting to 3,729.57 acres. The offshore lands fared less well with a total of

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\$80,726.54 on 12,776 acres (7 tracts) - an average per acre of \$6.318. The money from the priversity lands is designated for use by Alaska University, and the funds from the offshore ands is ticketed for the State's general fund. There were no bids on one tract offered. The over-all average was \$24.70 per acre.

The high per acre bid was offered by Union of Cal - Ohio: \$430.50 per acre on 30.91 acres of University lands. The low bid was \$1.00 per acre on the two offshore tracts successfully bid on by Leroy Hines totaling 2,895 acres.

Last December the State held its first competitive oil and gas lease sale offering only offshore lands. The average per acre bid was \$51.66 on 77,716 acres, bringing the State \$4,021,031.43.

DRILLING NEWS

Operator	Well Name & No.	Status End of July
SCCAL	SRU 12-15	Spud 7-23-60, cmnt. 13-3/8" csg @ 3167'
SOCAL	SRU 32-33	Drlg @ 10701'
SOCAL	SRU 31-27	Workover - establishing water source
SOCAL	SCU 14-4	Drlg @ 11348'
RICHFIELD	Kaliakh River	
	Unit No. 1	Drlg @ 7682'
COLORADO	Dangerous River	
	Unit No. 1	Drlg @ 1954'
HALASKO	A&M - King 24-21	Drlg @ 10200'

PETROLEUM RESERVE NO. 4

On July 7 the Interior Department endorsed a proposal to open 23 million acres in northern Alaska to private development under the mineral leasing laws. The department sent its endorsement to the Senate Armed Services Committee which has before it a bill to abolish Naval Petroleum Reserve No. 4. The Reserve, established in 1923 embraces about 15,000 square miles between the Brooks Range and the Arctic Ocean. Barrow is the only major settlement. Under the proposal, lands within the range would be returned to the public domain and made available for mining claims, mineral leasing and other types of development.

EXPLORATION

On June 25 the Senate sent to the President a bill (H.R. 4251) which would remove the four-year limitation on the deductibility of exploration expenditures but retain the \$400,000 over-all limitation and the \$100,000 yearly limitation. This bill would provide some relief to taxpayers who have deducted less than \$100,000 of exploration expenditure in any year under the present provisions of Section 615 of the 1954 Code or under Section 23 (ff) of the 1939 code.

MINERAL INVESTIGATIONS RESOURCES MAPS

The USGS has just published maps (\$.50 each) of various mineral occurrences in lasks as of 1958. Occurrences of chromite, cobalt, nickel, platinum, copper, lead, zinc, molybdenum, tin, tungsten, antimony, bismith and mercury are spotted on a series of four maps, MR9 to MR11 inclusive. The maps are valuable for information and as a quick reference

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A hearing will be held when Congress reconvenes in August on a bill calling for the Federal Government to subsidize discovery, development, production and stockpiling of domestic tin. The only known tin deposits in North America are on Alaska's Seward Peninsula. The bill has passed the Senate and is now before the House.

GOLD RESERVE ACT

Treasury officials disagree with a published report that it is illegal to arrest a person for having melted gold in his possession. Ieland Howard, assistant director of the mint, conceded there are no criminal penalties in the Gold Reserve Act of 1934. Under this Act the civil penalty is confiscation of the gold plus twice its value. Howard pointed out that gold regulations are also backed up by the Trading With the Enemy Act of 1917 carrying 'iminal penalties up to 10 years imprisonment and \$10,000 fine. In addition, there are wiminal penalties for conspiracy and for violations of customs laws in the import and export of gold.

Possession of newly-mined gold in its natural state is not illegal. But its processing by melting or treatment with chemicals or other means, except under Treasury license, is forbidden. The constitutionality of both the Gold Reserve Act of 1934 and the Trading With the Enemy Act of 1917 has been upheld by the Supreme Court. Treasury attorneys concede the 1917 act is applicable only in a period of national emergency by the President. There has been a continuous series of emergency proclamations since 1933.

DEPLETION

As finally enacted, Public Law 86-564 signed by the President on June 30 contains an amendment extremely important to the mining industry, redefining "gross income from mining" for percentage depletion purposes. The depletion provision is permanent legislation, effective with respect to taxable years beginning after 1960.

The new law eliminates the "commercially marketable" test, and in the future the mining industry will be allowed to include in the depletion base those processes considered as mining and specifically described in the law, plus processes "necessary or incidental" thereto. The listing of processes is substantially as it was in prior law--"cleaning" is added in the case of sulfur; uranium is specifically named in the subsection which allows leaching, concentrating, etc.; and iron ore, bauxite, ball and sagger clay, rock asphalt and minerals which are customarily sold in the form of a crude mineral product are allowed processes which are "substantially equivalent" to sorting, concentrating, and sintering to bring to shipping grade and form. The furnacing of quicksilver is still allowable, but the listing thereof has been shifted to a different subparagraph.

The words "ores or minerals" have been used where the prior law used either "ores" or "minerals", to make it certain that the various subparagraphs cover all minerals whether or not they are "ores".

In the case of calcium carbonates and other minerals when used in making cement, he new law allows "all processes (other than preheating of the kiln feed) applied prior to the introduction of the kiln feed into the kiln, but not including any subsequent process."

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In the case of clay used, or sold for use, in the manufacture of building or paving brick, drainage and roofing tile, sewer pipe, flower pots, and kindred products, the new law allows "crushing, grinding, and separating the mineral from waste, but not including any subsequent process."

As to all minerals, there is authority for the Secretary to specify additional treatment processes if the allowing of such additional processes is not inconsistent with the other provisions of the law.

The "sudden death" provisions of the 1959 Treasury proposal, and the original Gore amendment, have been eliminated -- with the result that "leap-frogging" appears to be within the contemplation of the statute. In other words, where a mining process follows a nonmining process, the statute seems to provide for exclusion of the nonmining process for inclusion of the subsequent mining process. This interpretation is supported by Congressional discussion at the time of adoption.

The new definition lists certain processes which are not considered as "mining" pless such processes are otherwise provided for or are "necessary or incidental to processes so provided for." These so-called nonmining processes are "electrolytic deposition, roasting, calcining, thermal or electric smelting, refining, polishing, fine pulverization, blending with other materials, treatment effecting a chemical change, thermal action, and molding or shaping." These nonmining processes, however, are allowable as mining processes in those cases where they are specifically provided for in previous subparagraphs of the law -- including, for example, any possible fine pulverization or any blending of minerals used in making cement prior to the introduction of the kiln feed into the kiln; or in cases where such "nonmining" processes are necessary or incidental to allowable processes -- such as any fine pulverization that may take place in the grinding of ores preparatory to concentration.

ETCETERA

Bronze combines the strength of mild steel with corrosive resistance to sea water. The ability of bronze to withstand corrosion was vividly demonstrated by recovery of two Swedish warship cannons from the bottom of the sea near Stockholm after 292 and 330 years f immersion. The corrosion rate was but .0002 inch per year according to the Tin Research Institute.

The hydrocarbon fuel cell, which converts chemical energy into electrical energy in direct current form is now powering a full-scale tractor in successful field tests by Allis-Chalmers. The fuel cell has a possibility of 90% efficiency, whereas the best of diesel engines is about 40% efficient.

Ten aluminum mine cars tested in a West Virginia Coal Mine indicate that aluminum cars can withstand rugged service and decrease mine operating costs. The 17-ton cars weigh nearly 50% less than comparable steel cars, allowing the locomotive to pull 10% more loaded cars per train, without increasing gross train weight. After a year and a half of service, the cars show no signs of corrosion.

E. AND M. J. METAL MARKET PRICES

	July 21	Month	Year
	1960	Ago	Ago
Copper, per 1b. Lead, per 1b. Zinc, per 1b. Tin, per 1b. Nickel, per 1b. Platinum, per oz. Quicksilver, per flask Silver, foreign, New York Silver, domestic, per oz. Antimony ore, per unit Chrome ore, per long ton Titanium ore, per ton Tungsten ore, per unit Molybdenum conc., per 1b. Beryllium ore, per unit	33.0¢ 12¢ 13¢ 103.4¢ 74¢ \$81-85 \$211-214 91.4¢ 90.5¢ \$3.30-3.35 \$35-36 \$23-26 \$24-25 \$46-48	33.0¢ 12¢ 13¢ 101.9¢ 74¢ \$81-85 \$211-214 91.4¢ 90.5¢ \$3.30-3.35 \$35-36 \$23-26 \$24-25 \$1.25 \$46-48	29.9¢ 12¢ 11¢ 102.3¢ 74¢ \$76-80 \$236-238 91.4¢ 90.5¢ \$3.10-3.20 \$35-36 \$23-26 \$20-22 \$1.25 \$46-48